

ATTACHMENT A
REMARKS

Considering the matters raised in the Office Action in the same order as raised, the drawings have been objected to for various reasons. New drawings are submitted herewith which are believed to overcome the objections raised. More particularly, Figure 1 has been labeled --Prior Art—as required by the Examiner and the numbers in Figure 10 and other figures now correspond to the description thereof set forth in the specification. Further, the defects listed on the attached form PTO-948 have also been addressed in the new drawings.

Claims 1, 4, 7-9 and 11 have been rejected under 35 U.S.C. §102(b) as being “anticipated by” the Souza patent while claims 2, 3, 5, 6 and 10 have been rejected on the Souza patent in view of various different secondary references. These rejections are respectfully traversed.

It is noted that the international patent application on which the present application is based was amended during the International phase so as to more clearly define the invention and thus distinguish from the cited prior art including the Souza patent. The original claims presented in this application correspond to the amended claims presented in the international patent application. Independent claim 1 has been restricted to recite the specific configuration of the conical-shaped diaphragm which is constructed so that the non-return valve allows fluid to flow in a single direction only. It is respectfully submitted that the combination of distinguishing features defined in independent claim 1 defines over the Souza patent and is important to the operation of the valve, as is emphasized throughout the specification. Some examples of this include the following:

1. At page 8, lines 8-10: "The diagram 14 is configured as a generally conical-shaped element having a collapsible opening or aperture 22 located at or adjacent to its apex";

2. At page 8, lines 10-16: "The conical diagram 14 is orientated with its apex in a downstream flow direction. The resiliently flexible material from which the diagram 14 is constructed shows that the diagram 14 in a collapsed condition obstructs or closes the aperture 22 to prevent fluid flowing in a reverse direction toward the inlet 18";

3. At page 10, lines 23-28: "When the nozzle is retracted from the valve 50 the valve membrane 54 returns to its collapsed condition wherein it obstructs or closes the collapsible opening 70. Thus, in the collapsed condition fuel vapour is prevented from escaping the tank or flowing in a reversed direction toward the inlet 58";

4. At page 12, lines 18-21: "Importantly, the diagram 200 or 220 includes a collapsible aperture 240 or 260 formed at its apex. The conical diagram 200 or 220 is orientated with its apex in a downstream flow direction".

Turning to the Souza patent, this patent relates generally to a flow control assembly, and, more particularly, to what is essentially a two-way valve 11. The valve 11 includes a cylindrical main body 12 defining a flow passage across which a pair of lip members 16 and 16' are formed. The lip members 16 and 16' are sealed together along their outside edge but are not sealed at their respective terminal end so that a slit-like, normally closed opening 26 is provided therebetween. Although the valve formed by lip members 16 and 16' may appear to be somewhat conical in figures such as Figures 6A to 6C, it is clear from Figure 1 and other figures that the valve is actually of a non-conical shape including a flattened end portion. The valve assembly formed by lip

members 16 and 16' is used as a two-way valve such as that employed in closing a toy balloon, as illustrated in Figure 5 of the reference. The lip members 16 and 16' are directed inwardly of the toy balloon and air passes through the passage 13 so that the slit-like opening 26 formed by lip members 16 and 16' opens to admit air to the balloon. The air pressure within the balloon forces lip members 16 and 16' to converge towards each other so as to close the opening 26. In contrast to the present invention, the slit opening 26 is designed so that air can also be exhausted from the balloon, and this is effected by applying force to the main body of the valve in a line parallel to the slit opening 26 so that air flows outwardly from the balloon.

It is respectfully submitted that the non-return valve defined in claim 1 patentably distinguishes over the patent. Non-return valves per se are, of course, well known in the art and an example is a conventional check valve which permits flow in one direction only. This non-return characteristic is clearly defined in claim 1 wherein the valve is recited as allowing "fluid to flow through the passageway from the inlet to the outlet only." In contrast, as set forth above, the Souza patent is directed to what is essentially a two-way valve. In this regard, as discussed above, the lip members 16 and 16' of the Souza patent are designed specifically to prevent flow in a reverse direction (as set forth in column 2, lines 64-66 and column 3, lines 58-67). This lip construction clearly contrasts with the conical-shaped diaphragm of the present invention as claimed in claim 1. Thus, the two-way valve of the Souza patent is different in both construction and function from the present invention as defined in claim 1 wherein the claim is limited to a conical-shaped diaphragm which allows flow in the downstream direction only.

Allowance of the application in its present form is respectfully solicited.